

Chadwick (J. R.)

THE Cases of Pregnancy and Labor, complicate'd with Fibroids, with remarks. By James R. Chadwick, M. D., of Boston. — Read at the Annual Meeting of the Massachusetts Medical Society, June 9, 1885.

box 247

TEN CASES OF PREGNANCY AND LABOR,
COMPLICATED WITH FIBROIDS,
WITH REMARKS.

By JAMES R. CHADWICK, M.D.
OF BOSTON.

Read at the Annual Meeting of the Massachusetts Medical Society,
June 9, 1885.



CASES OF PREGNANCY AND LABOR, COMPLICATED WITH FIBROIDS.

CASE. I.¹—*Labor complicated with Uterine Fibroids and Placenta Prævia.*

May 12, 1875. Mrs. M., aged 42, had menstruated but twice in the past six months, the last time only two weeks before. Her abdomen had been slowly enlarging for six years owing to a fibroid tumor; the growth had been more marked during the last few months. A large hard mass lay on the right side, rising nearly to the liver; a small very hard tumor formed a distinct protuberance just above the navel; the epigastric region was occupied by a solid body connected with the main tumor, but only reached on deep pressure. Per vaginam the cervix was felt to be soft, the roof of the vagina less yielding than usual; no distinct tumor could be felt. On May 17th, a more thorough examination disclosed flatness over the greater part of the left side of the abdomen, although nothing could be felt except some small nodules.

These, however, were not immediately in contact with the abdominal walls, but were only reached by deep pressure in the direction of the pelvic cavity. Fluid alone could interpose between the abdominal walls and the nodules, and produce flatness, yet at the same time be so readily displaced as not to be perceptible to the touch. Ascitic fluid was soon excluded from consideration by the immobility of

¹ The reports of this and the next case are condensed from the Trans. Am. Gynæc. Soc., Vol. 2, pp. 255-267, 1877.

the flat area on change of the patient's posture. A fibro-cyst seemed very unlikely from the relations of the tumors; pregnancy flashed into my mind as the only condition that would explain the phenomenon satisfactorily, and this suspicion the stethoscope confirmed by the discovery of the foetal heart-sounds two inches below the umbilicus. It is needless to add that the nodules in the left side were the feet.

The peculiar doughy resistance around the cervix, the impossibility of bringing any part of the child within reach of the fingers in the vagina, together with the history of a haemorrhage within two weeks, caused me to suspect the presence of a placenta *prævia* as a further complication.

Mrs. M. passed to the full term of pregnancy without other untoward events than several smart haemorrhages, requiring only repose in bed for their arrest.

On August 13th the uterus began to contract feebly, but with some regularity. Haemorrhage set in, and soon assumed alarming proportions; it was checked by plugging the vagina with a Barnes's dilator.

Examination twenty-four hours subsequently revealed the fact that, despite the regular recurrence of the pains in the interim, the os barely admitted one finger. The pains had not increased in severity or assumed at all the force of true labor-pains; yet the woman was beginning to show signs of exhaustion owing to them, and to the steady oozing of blood.

After consultation with Drs. A. D. Sinclair and E. G. Cutler, of Boston, ether was administered, and the cervix gradually dilated by digital pressure and manipulation. The placenta was *prævia*, but luckily only its border covered the os; this segment was readily peeled off and brought down into the cervix. The haemorrhage was but slight, and soon ceased.

The placenta was now found to have its seat immediately over a large fibroid in the posterior uterine wall, that de-

scended to the internal os, and proved a serious obstacle to the insertion of the hand. This was, however, at last effected, the feet seized and dragged down. The greatest traction that I dared apply only brought the knees to the vulva. With the exercise of great care, yet of considerable force, I insinuated a hand along the curve of the sacrum, between the abdomen of the child and the fibroid tumor; with great difficulty grasped one arm after the other, and brought them into the vagina, fracturing the right clavicle during the process. By continuous forcible traction the shoulders were finally delivered, though the head evidently remained above the brim of the pelvis.

Again and again I tugged upon the body while Dr. Sinclair pressed the head down from above the pubes. At length it descended suddenly into the pelvis and was at once delivered. The child, weighing ten pounds, lived.

The placenta not coming away and there being no expulsive efforts of the uterus, the former was removed in a somewhat torn condition by the hand. In order to make sure that no portion had been left, I introduced my hand into the vagina, and to my dismay felt it pass into the peritoneal cavity outside of the uterus. Above the fundus of the uterus could be felt the intestines, but they showed no tendency to descend into the pelvis. A careful examination of the rent by Dr. Sinclair and myself, made evident that it was a transverse tear of the vagina, three or more inches in length, situated just below the insertion of the vagina into the posterior lip of the womb. Just above this lip, it must be remembered, was the large fibroid which had obstructed delivery.

Had I had my way at this point, I should have then and there extirpated that uterus by abdominal section, and the operation now known as Porro's would have been Chadwick's operation; but I was restrained by the counsels of Drs. Sinclair and Cutler, which I still recognize as wise from the standpoint of the experience of that day.

There seemed to be no haemorrhage, so the ether was removed, the woman turned upon her back, and a tight bandage applied, by which means it was hoped that the edges of the wound would be kept in apposition, owing to the pressure of the uterus.

It is useless to give the subsequent history in detail. The first day was passed in perfect comfort; on the second, symptoms of peritonitis began to appear. On the third day the abdominal distention was so great as to require puncture of the intestines to allow the escape of flatus. Through the same trocar I essayed the injection of nutrient and stimulant fluids into the intestinal canal. The feasibility and objects of this procedure were fully set forth in a paper which I read before the New York Obstetrical Society on November 2d, 1875.¹ On the fourth day septicæmia and delirium set in, terminating fatally on the fifth day.

No autopsy could be obtained.

Several points in this case seem to merit consideration.

I will not dwell upon the very misleading character of the history as elucidated at the first visit, but I wish to emphasize the importance of having perfect accordance between the signs obtained by the different methods of examination,—in this instance, by palpation and percussion. By a neglect to recognize the discrepancy between the testimony derived from these two sources, I failed to make a correct diagnosis at my first examination, though I repaired the omission at the second visit. This point is further illustrated by

CASE II.—Pregnancy complicated with one Fibroid Tumor.

1876. Mrs. F. M., 33 years of age, had been married fifteen years without having had children or miscarriages. Menstruation had always been regular until seven months previously; since then it had not been seen.

¹ *American Journal of Obstetrics*, vol. viii. No. 3, Nov. 1875.

Five months before, she had consulted one of the most eminent and trustworthy physicians of Boston, whose notes describe the cervix as "hard, red, and granular," almost exciting a fear of commencing cancer. Nothing else abnormal was recognized.

Three months later he records another examination as follows: "cervix soft, os patulous; several large distinct tumors in the abdomen, forming a mass four or five inches in diameter, and lying between the umbilicus and pubes; one tumor was more prominent than the others. Other indistinct tumors in right iliac region. *Dullness on percussion extends beyond the distinct tumors.*" An unfavorable prognosis was given, which was concurred in a month later by one of our most prominent ovariotomists. She had not been examined since that time until, chancing to be making a professional visit in Holbrook, Mass., I was requested to see her in consultation with Dr. Kingsbury of that town. It required no great acumen on our part to recognize at that advanced stage, the existence of pregnancy at about the end of the seventh month, complicated by a fibroid tumor larger than a man's fist, in the anterior uterine wall.

The patient was delivered safely by Dr. Kingsbury two months after; at the end of another two months I was unable to find any trace of the fibroid.

I believe that the suggestion conveyed in the phrase which I have italicized would, if followed up, have given a clue to the true condition, although it was too early to hope for decisive signs at that time.

Another diagnostic point of the utmost significance is the sudden, rapid increase in size of a fibroid tumor which has been stationary for some time, especially if this coincides with absence of menstruation. This was the chief factor in the diagnosis of the following case, the notes of which have been kindly sent me by Dr. G. J. Townsend, of Natick, with whom I saw the patient in consultation.

CASE III.—*Pedunculate Fibroid complicating Pregnancy and Labor. Delivery by Forceps. Speedy Absorption of the Tumor.*

Mrs. J. P. S., of Natick, aged thirty-eight years, four years married, primipara, menstruated last in February, 1882. In April she noticed a lump in the left iliac region, which, after some over-exertion, became painful and tender to the touch. In the latter part of May, Dr. Townsend was called in, and found an irregular nodular mass in the left iliac region, rising nearly to the crest of the ileum; the body of the uterus could not be felt. Pregnancy was suspected. I saw her on June 5th, and could recognize nothing definite but a fibroid tumor crowding the body of the womb, which was soft and indistinct, to the right side. The development of the tumor had, however, been far too rapid to accord with the clinical history of such growths. From this fact and the absence of menstruation, I had no hesitation in endorsing the previously expressed opinion that she was pregnant, and to give the assurance that no special danger was to be apprehended at the time of labor, owing to the fact that the tumor was manifestly subperitoneal and attached to the fundus of the uterus. The tumor increased greatly in volume as the pregnancy advanced, finally reaching as high as the margin of the ribs on the left side, and pushing the body of the womb to the right side. A pedicle running to the left horn could then be made out by Dr. Townsend. She experienced no inconvenience during pregnancy, except from undue distension of the abdomen. The labor, at full term, was tedious, owing to uterine inertia, finally necessitating a resort to forceps by Dr. Townsend. Convalescence was normal, except for an attack of cystitis. Involution was perfect, and no trace of the tumor could be detected three weeks after delivery. The patient is now (Feb. 17, 1885) in perfect health.

Brief notes of another case which occurred in his practice have been sent me by Dr. Townsend.

CASE IV.—Multiple Fibroids complicating Labor.

Mrs. J. S., aged forty years, primipara, was found by Dr. Townsend to have multiple subperitoneal fibroids in the fundus uteri when he was called to attend her in labor. Delivery was effected easily without interference. Involution was normal, and the fibroids had entirely disappeared two weeks after delivery. She is still living, at the age of seventy years.

This freedom from interference by the tumors with the normal course of pregnancy and labor I have learned to regard as the rule when the tumor has its seat in the body of the womb, so that it rises with the fundus out of the pelvis and thus presents no obstacle to the delivery of the child. I have had several such cases, of which the notes are now lost—or rather buried in the records of my Dispensary. One private case I can quote.

CASE V.—Fibroids complicating Pregnancy and Labor. Normal Delivery. Subsequent Disappearance of the Tumor.

Mrs. G. W. M., of Newton, aged thirty-six years, who had had six children and two miscarriages, was sent to me on April 17, 1878, by the late Dr. Allston W. Whitney, of West Newton. Since the birth of the last child, three years before, there had been some enlargement of the right side of the abdomen. She had not menstruated for six months. The vulva was found to be enormously distended by varicose veins. The abdomen contained a tumor, rising from the pelvis to an inch above the navel. Its general outline was symmetrical, but just above the navel projected a hard rounded mass as large as a fist, and a second small hard nodule below the other, and further to the right still a third. The rest of the tumor is soft and manifestly the pregnant uterus, within which the foetal parts can be distinguished. The hard projecting masses are plainly fibroids. The woman was delivered without mishap on August 1st.

On October 28th she visited me again, as the abdomen had remained greatly distended ever since the labor, and she feared that the tumors had not been absorbed in child-bed, as I had assured her would be the case. On examination I found that the distension was entirely due to relaxation of the abdominal walls and to flatulence. The uterus was in every respect normal. There was no trace of the fibroids.

In the later months of pregnancy the difference in density of a fibroid and the pregnant uterus is generally so marked as to make the diagnosis simple; the same cannot be said of a fibro-cyst. Such I now conjecture to have been the tumor in the following patient whom I did not see when pregnant.

CASE VI.—Cystic Tumor, diagnosticated as Ovarian. Subsequent Pregnancy and disappearance of Tumor after Labor.

Mrs. E. P. M., of Malden, was sent to me by Dr. Alonzo Towle, of that city, on Oct. 27, 1878. She was thirty-one years of age, had been married eleven years, but had never been pregnant. The lower part of the abdomen was filled with a tumor resting upon the brim of the pelvis and rising as high as the navel. The uterus was retroverted, of normal size, and seemed to move independently of the tumor. The wave of fluctuation could be obscurely felt throughout the abdomen. The diagnosis was an ovarian cyst, as had been Dr. Towle's previously.

A year later this woman became pregnant, was delivered on July 12, 1880, by Dr. Towle, by forceps, owing to a large foetal head and a small pelvis; the child weighed twelve pounds, but lived only four hours. The woman made a good recovery, and at the end of the fourth week no tumor could be found, and there had been no recurrence when the patient was last seen by Dr. Towle, in January, 1882.

The disappearance of the tumor after delivery leads me to change my diagnosis, for I believe that an ovarian tumor

would not have been dissipated as a result of pregnancy, whereas it is the rule with fibroids. I believe it to have been a soft fibroid or fibro-cyst; it might have been a cyst of the broad ligament which ruptured during labor and did not recur; an ovarian tumor it could not have been.

*CASE. VII.—Two Fibroids complicating Pregnancy.
Miscarriage at three and a half months.*

Mrs. K. McH., aged 33 years, was married on April 12, 1882, having ceased to menstruate a few days before. She consulted me on July 27, and reported not having menstruated since her marriage. For six months she had noticed a lump in the left side of her abdomen, which had of late increased rapidly in size, and within a few days had become sore. Micturition was frequent; she had nausea. Examination disclosed a fibroid tumor as large as a cocoanut in the left side of the abdomen; in the right iliac region was another as large as a plum. The vaginal entrance revealed a very characteristic bluish discoloration of pregnancy. The cervix was soft, as was the body of the womb felt through the anterior vaginal wall. The diagnosis of pregnancy at three and a half months, complicated with an interstitial fibroid in each horn of the womb, was unequivocal. I prescribed viburnum and cannabis indica.

On August 1st, she reported having passed something that "felt like an egg" and was followed by some haemorrhage.

On August 4th, I removed a foul placenta, after which the haemorrhage soon ceased.

She had a normal convalescence: The smaller tumor entirely disappeared within two months, perhaps owing, in part, to ergot and muriate of ammonia. The larger tumor remained unaltered in size; still, on Jan. 12th, the uterine cavity measured but three inches in length.

On April 17th, 1883, she reported having had no menstruation for two months. The tumor was no larger than

formerly. There was no evidence of pregnancy, yet it was suspected. Since then I have been unable to trace her.

CASE. VIII.—*Submucous Fibroid in Pelvis complicating Labor. Transverse Presentation. Delivery by Version of still-born Child. Protrusion of Fibroid through the Os. Death from Septic Poisoning.*

Mrs. E. D. R., aged 40 years, who had had one child seven years before, consulted me on March 22, 1881, with the statement that it was five weeks since she had menstruated; there was no evidence of pregnancy except a very marked blue tinge to the vaginal entrance. The uterus was enlarged considerably by an irregular hard mass, manifestly a fibroid. On April 22, the uterus had increased greatly in size, was triangular in shape, the left horn reaching nearly as high as the umbilicus. Pregnancy was diagnosed.

As the patient lived in Somerville, I requested Dr. W. W. Dow, of that city, to take charge of her confinement. The subsequent notes are mostly supplied by him.

On Dec. 6, labor pains set in, but were feeble until the evening of December 8th, when the os was partially dilated; the child's left side presented, the head lying in the left side of the womb; the fibroid occupied the right half of the pelvic cavity. At 9, P.M., the patient was etherized by Dr. W. A. Bell, and the os slowly dilated by Drs. Dow and Bell. Dr. Dow then passed his hand into the uterine cavity round the fibroid which was larger than the foetal head at full term. First the left and then the right foot were successively seized and brought down into the vagina, and after continuous traction, supplemented by external pressure, a still-born child weighing eight pounds was delivered. Ergotin was injected subcutaneously. The placenta came away spontaneously in fifteen minutes. Very little blood was lost. The uterus contracted well. The fibroid, which had a broad attachment to the right side of the uterus,

completely filled the dilated os and projected into the vagina as though in process of extrusion.

During the next three days ergot was administered and the vagina frequently washed with carbolized water.

On December 12th, the lochia became offensive and the pulse rose to 106 and the temperature to 101.4° F.

December 13 and 14, Pulse 112 Temperature 102° F.
 " 15 " 118 " 103° F.
 " 16 " 120 " 101.6° F.
 " 17 " 120 " 102.4° F. Diarrhoea.
 " 18 " 120 " 104° F. Chill.

An intra-uterine douche of carbolized water was carried past the fibroid, which had retreated from the vagina but still plugged the os, to the fundus.

December 19th, Pulse 118. Temperature 103.2° F.
 Intra-uterine douches.

I saw her that evening and washed out the uterine cavity thoroughly with a solution of permanganate of potash, and advised an increase of the quinine to 20 grain doses.

December 20th, Pulse 116 Temperature 102.4° F.
 " 21st " 120 " 102° F.
 " 22d " 112 " 100.4° F. Chill.
 " 23d " 120 " 102.4° F. Chill.
 " 24th " 126 " 101.1° F. Chill.
 " 25th " 120 " 103.6° F. Chill.

I saw her again and suspected septic peritonitis from the abdominal distension.

December 26, 7 A.M., Pulse 98 Temperature 100.2° F.
 " " 10 P.M. " 118 " 105.2° F.
 " 27 " 126 " 100.2° F.

Patient is evidently failing.

December 28, 7 A.M., Temperature 100° F.
 " " 6 P.M. " 101° F.
 " 29 7 A.M. " 100.2° F.
 " " 6 P.M. " 103.2° F.
 " 30 7 A.M. " 100.4° F.
 " " 6 P.M. " 103.2° F.
 " 31 12 M. " 99.8° F.
 " " 6 P.M. Death on twenty-third day of child-bed.

The intra-uterine douche was administered every six hours during the last two weeks of her life.

At the autopsy the uterus was found to be but little involuted, and contained a fibroid tumor eight inches in length by five in transverse diameter, deeply imbedded in the uterine wall just above the inner os on the right side, and projecting into the cervical canal, distending it as low as the external os. The surface of the tumor was superficially gangrenous, as was the whole lining membrane of the uterine cavity. It did not seem as though any attempt at enucleation of the tumor during child-bed could have been crowned with success.

The notes of the two following cases have been kindly sent me, with permission to incorporate them in my paper, by Dr. Emma Call, of this city.

CASE IX.—Subperitoneal Fibroid complicating Labor. Septic Infection. Recovery, with complete Disappearance of the Tumor.

Mrs. A., aged 24 years, primipara. Previous to her pregnancy she had been treated for cervical catarrh by Dr. Lucy Sewall, who had recognized slight enlargement of the womb but no tumor.

On November 27th labor set in, when a solid subperitoneal tumor, the size of a fist, was discovered projecting from the anterior wall of the uterus. The presentation was normal, but the pains were feeble and the patient exhausted, so that delivery was terminated by means of the forceps applied when head had reached the pelvic outlet. The expulsion of the placenta was followed by a severe haemorrhage.

For the subsequent six weeks the patient had a mild form of septic infection, not attended by chills. The temperature ranged from 99° F. to 101°. The lochia was profuse and offensive for a few days, until treated by douches and suppositories of eucalyptus. The uterus was tender, especially about the tumor, and there was some effusion into the

cellular tissue on the left side. Involution was tardy, so that the patient did not leave her bed for three months, when the uterus was no longer tender and the tumor was half its former size. A year later no trace of the tumor could be detected. She is now well advanced in her second pregnancy, but, having removed from the city, is no longer under observation.

CASE X.—Submucous Fibroid and Albuminuria complicating Labor. Septic Poisoning. Recovery without Disappearance of the Tumor.

Mrs. B., aged 36 years, primipara, three years married. A year previous she had had a sudden severe haemorrhage. Menstruation had always been profuse. During the last month of pregnancy her limbs were œdematos, and the urine contained much albumen and a few hyaline casts. The quantity of urine was normal, and she only suffered from insomnia.

On January 16th, 1885, labor began at midnight; the membranes ruptured at 4, A.M. January 17th, Dr. Call found the head presenting. But little progress was made in the next twelve hours, so that, after consultation with Dr. Lucy Sewall, the forceps were applied while the vertex was lying transversely in the pelvis. In spite of efforts to the contrary, the occiput rotated into the hollow of the sacrum and was with difficulty delivered. The child was still-born. After delivery of the placenta, the uterus not contracting satisfactorily, a hot intra-uterine douche was given, when a solid sessile tumor, the size of a goose's egg, was discovered projecting into the cavity from the posterior wall of the uterus. During the first week of child-bed the patient was nervous and sleepless, the pulse quick, the temperature ranging from 99.5° F. to 101°. The urine was highly albuminous, the bladder irritable. The lochia were normal, except for slight fœtor on third to fifth days, which was corrected by douches and iodoform suppositories.

On the tenth day there were two severe chills; the fundus was three fingers width above the pubes. There was slight tenderness to the left of the uterus per vaginam. The lochia were scanty and purulent, but not foul. From January 25th the patient presented the usual symptoms of septic infection, the temperature ranging from 103° F. to 105° , the pulse 108 to 120.

On January 29th, Dr. John P. Reynolds and Dr. Sewall saw the patient in consultation with Dr. Call, and confirmed the diagnosis.

On February 1st, the symptoms began to abate, and had entirely subsided by February 10th.

On March 1st, Dr. Call found the uterus still larger than normal, with unusual prominence of the posterior wall.

On March 3d, the patient began to menstruate. The flow was moderate and without pain, but lasted eleven days.

The results of these ten cases of pregnancy and labor complicated with fibroids may be thus summarized:

Miscarriage,	1 case.
Recovery of Mother,	7 cases.
Death " "	2 "
Living Child,	7 "
Still-born Child,	2 "

With regard to miscarriage, it has been shown by Lefour¹ that this effect of the complication of pregnancy with fibroids is not so common as might be expected. In two hundred and twenty-seven cases which he cites, miscarriage occurred but thirty-nine times, which is once in 5.82 cases. These figures show no more liability to miscarriage than in cases of pregnancy uncomplicated with fibroids.

The prognosis for the mother, indicated by my cases, is much better than is warranted by the accepted statistics. Thus Lefour² states, that in two hundred and eighty-six

¹ Les fibroïnes utérines au point de vue de la grossesse et de l'accouchement. Paris, 1880, p. 94.

² Loc. cit., pp. 218-220.

cases, including those women who miscarried as well as those who went to full term, one hundred and forty-one mothers died, which is one in 2.02 cases. W. Süsserott¹ states, that in one hundred and forty-seven cases which he compiled, seventy-eight mothers died = 53%.

The rates of mortality for the mothers, above cited, I believe to be much higher than we should have were all cases to be reported, it being manifest that those cases presenting no serious results are often thought unworthy of publication.

With regard to the children, Lefour found that of fifty-two infants, thirteen were dead born. Süsserott states, that of one hundred and thirty-eight (including one case of triplets and two of twins) children, forty-seven only survived = 34%.

Regarding the position of the child at time of labor, my cases show seven presentations of the head and two transverse presentations. Lefour shows, that in one hundred and two cases there were fifty-two presentations of the head (50.98%), thirty-three of the breech (32.35%), and seventeen of the trunk (16.66%). A much larger proportion of anomalous presentations is thus shown by a comparison of the figures with those published by Depaul,² who had in a total of 16,233 labors of all kinds,

15,119	presentations of the head	=	93.1	%
633	"	"	breech	= 3.9 "
189	"	"	trunk	= 1.16 "

In each of my two cases of transverse presentations the tumor partially filled the pelvis, so that a transverse position of the child must almost of necessity have occurred. This should be borne in mind by obstetricians in the management of such cases.

¹ Beiträge zur Casuistic der mit Uterus myomen complicirten Geburten. In.-Diss. Rostock, 1870, p. 49.

² Lefour. Loc. cit., p. 120.

With regard to the special complication of labor induced by the presence of the tumor, the above cases illustrate the frequency of inertia of the uterus and the liability to septic poisoning in child-bed. This latter danger is hardly mentioned by the authors above quoted; but this omission on their part is attributed to the new views of the pathology of child-bed which have come to prevail since the cases occurred of which their compilations are largely composed.

The presentation of a large tumor at the external os, as in Case VIII., immediately after delivery, would seem to be almost a unique observation, though several cases are cited in which a tumor thus presented in the later days of child-bed. As septic poisoning, with fatal result, occurred in this case, when no attempt at enucleation was made, it may be fairly doubted whether an operation would not have determined a different issue. The post-mortem condition, however, seemed to confirm our previous belief that any operation for removal of the tumor would have been very difficult, very bloody, and, if successful, have left an immense wound for the absorption of septic matter.

The degree of danger to which the woman is exposed in these cases undoubtedly depends greatly upon the precise location of the tumor. Thus in Cases II., III., IV., V., VI. and IX., the tumors appeared to be subperitoneal, and all passed through labor and child-bed without complication, except for slight septic infection in Case IX. In Cases I., VIII. and X. the tumors were sub-mucous, and two died, while the third recovered after septic infection in child-bed. The location of the tumor in the lower segment of the uterus, so as to interfere with the delivery of the child, introduces the most serious element of danger during delivery. Should this condition exist, and a vigorous attempt under ether to elevate the tumor from out the pelvis early in pregnancy fail, induced abortion or at least premature labor would be the safest course to pursue.

Regarding the effect of pregnancy and labor upon the tumors, my cases demonstrated, in accordance with the accepted teachings, that the tumors increase enormously in size with the progress of the pregnancy. After labor, however, the current belief is that the tumors return to the size from which they started before pregnancy. That this is an error would seem to be made clear by the fact that in six of the eight patients who survived, no trace of the tumors could be found post-partum, at observations recorded after an interval varying from two weeks to twelve months respectively (Cases II., III., IV., V., VI., IX.). In Case VII., in which miscarriage occurred at three and one-half months, one tumor was entirely absorbed, and the other was unaltered in size. In Case X., the tumor was sessile and only as large as a goose egg, but appears not to have been absorbed.

The above experience would seem to warrant the following deductions, which do not make a part of the doctrines hitherto prevalent upon the subject.

As aids to *diagnosis*, the following points should have great weight :

- 1.—An area of flat percussion beyond the limits of the tumor or tumors.
- 2.—Unduly rapid growth of a fibroid.
- 3.—Blueish discolorations of the vaginal entrance.

As to *treatment*:

- 4.—That intra-uterine disinfectant douches should be administered throughout the puerperal period in all cases, even before the supervention of symptoms.

As to *prognosis*:

- 5.—That fibroids are, as a rule, absorbed during involution of the uterus or soon after.

